

# 1553 Manchester Encoder

**SERIES: MAE-8782**

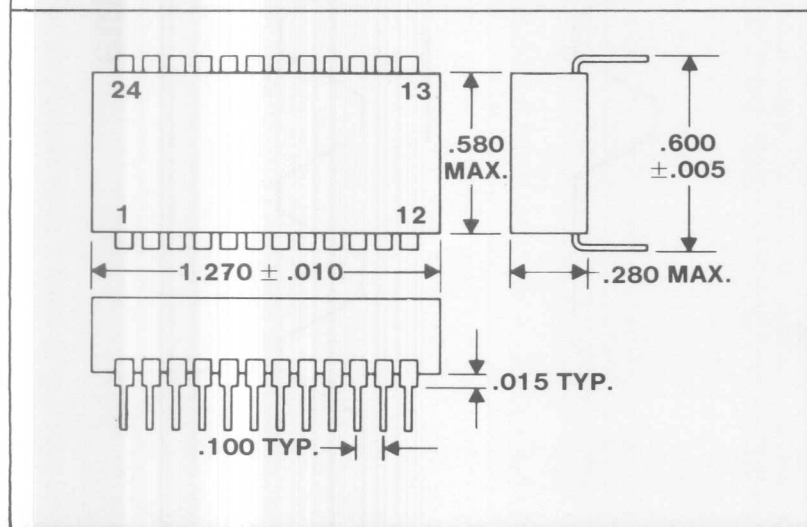
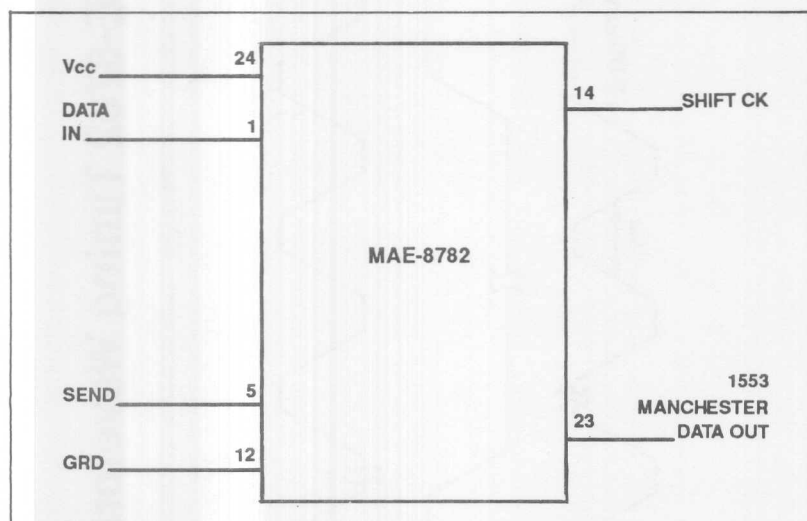
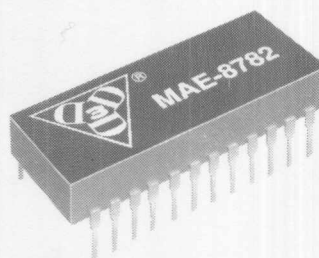
**(20 MBAUD)**

**data  
delay  
devices, inc.**



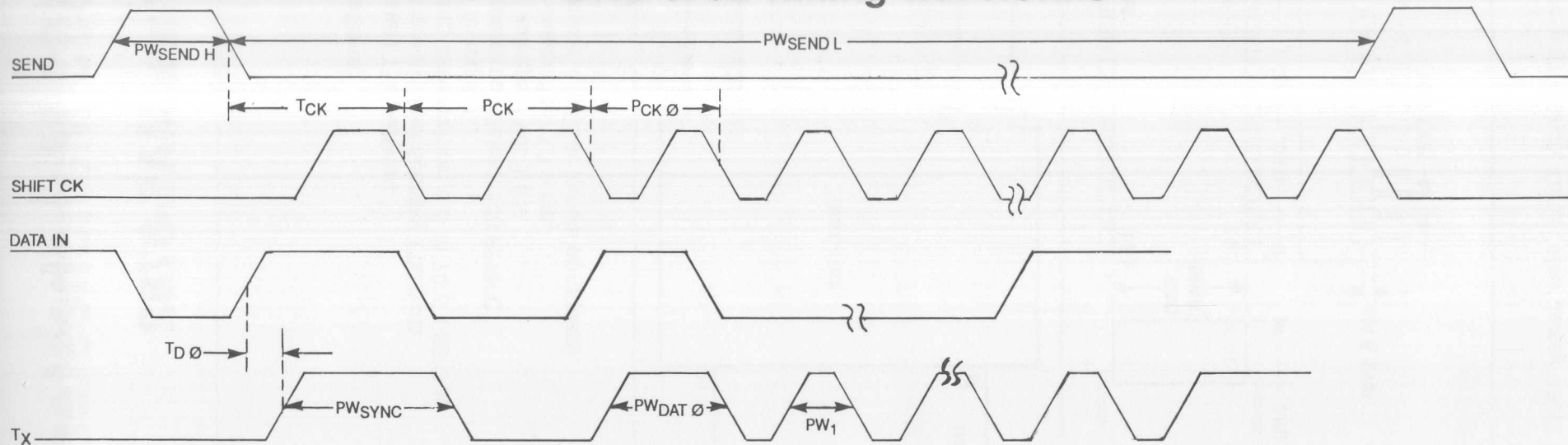
## Specifications:

- **Completely TTL buffered.**
- **Output fan-out:** Fast Schottky TTL loads.
- **Operating temperature:** 0°C to 70°C (-55°C to +125°C on request).
- **Temperature coefficient:** 100 PPM/°C.
- **Supply voltage:** 5 Vdc  $\pm$  5%.
- **Power dissipation:** 1.3 w typ.
- **Data rate:** 20 MBIT/sec (others on request).



**See Other Side  
For Timing Waveform**

## MAE-8782 Timing Waveforms



$PW_{SEND\ H} = 70\ \text{nsec min.}$

$PW_{SEND\ L} = 2 * PW_{SYNC} + 16 * PW_{DAT\ \emptyset}$

$T_{CK} = P_{CK} = 75\ \text{nsec typ.}$

$P_{CK\ \emptyset} = 50\ \text{nsec} \pm 5\%.$

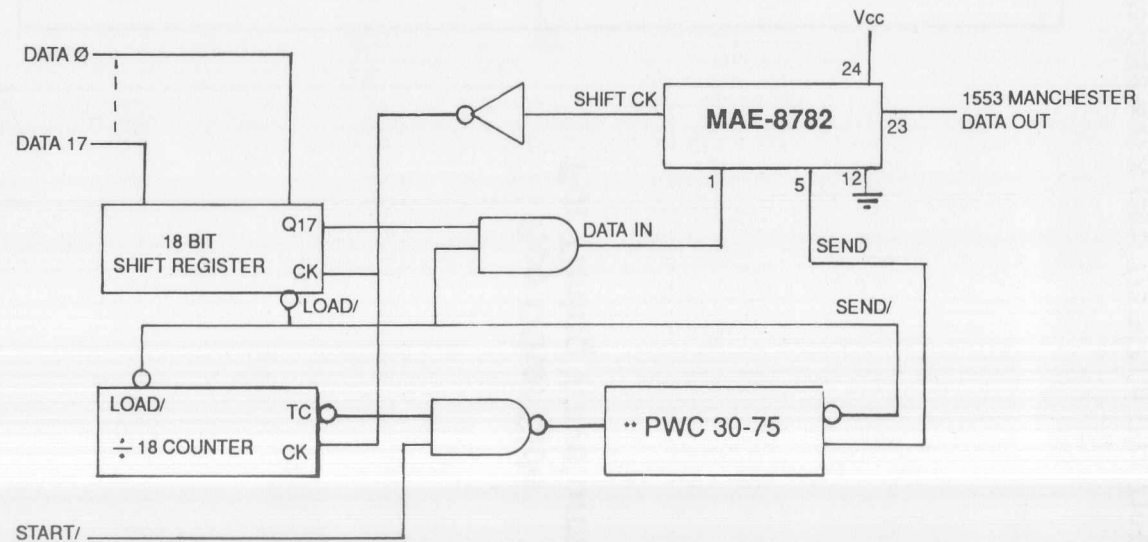
$PW_{SYNC} = 75\ \text{nsec} \pm 5\%.$

$PW_{DAT\ \emptyset} = 50\ \text{nsec} \pm 5\%.$

$PW_1 = 25\ \text{nsec} \pm 5\%.$

$T_{D\ \emptyset} = 5\ \text{nsec typ.}$

\*\* Data Delay Devices Rising Edge Triggered Pulse Width Controller. It generates a precise and stable 75 nsec pulse.



Typical Encoder Interface